EXHIBIT 36

1. Commercial Chemical Product Lines
2. General Toxicity
3. Sulfonic Acid & Carboxylic Acid Derivatives
   a. Review of Subchronic Data
   b. Metabolism Data
4. Summary

COMMERCIAL CHEMICALS PRODUCT LINES

"FLUORINERTS"	ELECTRONIC LIQUIDS
"FLUOREL/KEL-F"	ELASTOMERIC RUBBER/PLASTICS
"LIGHT WATER"	AQUEOUS FILM FORMING FOAMS FIRE FIGHTING LIQUIDS
"SCOTCHGARD, SCOTCHBAN"	TEXTILE/PAPER TREATMENTS
"FLUORAD"	SURFACTANTS

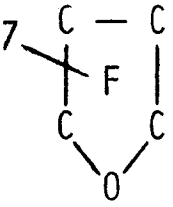
"FLUORINERT" ELECTRONIC LIQUIDS

PERFLUORINATED CARBON CHAINS

FC-88	PERFLUOROPENTANE	C_5F_{12}
FC-72	PERFLUOROHEXANE	C_6F_{14}

BLENDS OF PERFLUORINATED CYCLIC ETHERS AND PERFLUORINATED CARBON CHAIN

FC-75 $C_8F_{16}O$ (CYCLIC) + C_8F_{18}

FC-43 C_8F_{17}  + $C_{11}F_{24}$

USES; VAPOR PHASE SOLDERING, QUALITY CONTROL FOR ELECTRONIC PARTS, HEAT TRANSFER FLUIDS, COOLING OF ELECTRONIC COMPONENTS

TOXICITY OF "FLUORINERT" BRAND ELECTRONIC LIQUIDS

"FLUORINERT" LIQUIDS	ACUTE ORAL TOXICITY LD_{50} (Rat)	SKIN IRRITATION (Rabbit)	EYE IRRITATION (Rabbit)	ACUTE INHALATION LC_{50} (Rat)
FC-88	34.6 g/kg (oral)	Non-irritating	Non-irritating	No deaths when animals were exposed to 3300 mg/liter of air for 3 hours.
FC-78	10 g/kg (oral)	Non-irritating	Non-irritating	No deaths when animals were exposed to 340 mg/liter of air.
FC-72	34.6 g/kg (oral)	Minimally irritating	Non-irritating	No deaths when animals were exposed to near saturated vapors at room temperature for 2 hours.
FC-77	10 g/kg (oral)	Non-irritating	Non-irritating	No deaths when animals were exposed to 250 mg/liter for 1 hour at room temperature.
FC-104	23.1 g/kg (oral)	Non-irritating	Non-irritating	No Data
FC-75	34.6 g/kg (oral)	Non-irritating	Non-irritating	No deaths when animals were exposed to 750 mg/liter of air for 4 hours.
FC-40	34.6 g/kg (Intraperitoneal)	Non-irritating	Non-irritating	No deaths when animals were exposed to "near saturated" atmosphere at room temperature.
FC-43	10 g/kg (oral)	Non-irritating	Minimally irritating	No deaths when animals were exposed to 15 mg/liter for 4 hours at room temperature.
FC-48	34.6 g/kg (oral)	Non-irritating	Non-irritating	No deaths when animals were exposed to 90 mg/liter for 4 hours (300° F).
FC-70	10 g/kg (oral)	Non-irritating	Non-irritating	No deaths when animals were exposed to near saturated vapors at room temperature for 2 hours.

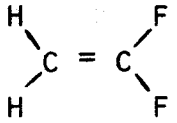
NOTE: All "FLUORINERT" Liquids, except FC-40, are classified as being practically non-toxic orally.
FC-40, is classified as being practically non-toxic intraperitoneally.

"FLUOREL/KEL-F" ELASTOMERS/THERMOPLASTIC

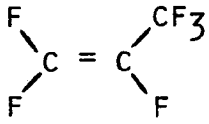
"FLUOREL" FLUOROELASTOMERS

COPOLYMERS OF

VINYLIDENE FLUORIDE



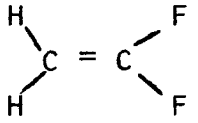
PERFLUOROPROPENE



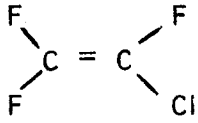
"KEL-F" THERMOPLASTICS

COPOLYMERS OF

VINYLIDENE FLUORIDE



CHLOROTRIFLUOROETHYLENE



USES: "FLUOREL": HEAT RESISTENT
O-RINGS, GASKETS, ETC.

"KEL-F": ACID/BASE RESISTANT THERMOPLASTIC LAQUERS, AND COATINGS FOR ALUMINUM, COPPER, STEEL & PLASTIC

TOXICITY SUMMARY OF

"FLUOREL" AND KEL-F" PRODUCTS

"FLUOREL" ELASTOMER

PRIMARY SKIN IRRITATION (RABBIT):	0.0/8.0 NON-IRRITATING
ACUTE INHALATION, THERMAL DECOMPOSITION:	10/10 DEATHS TOXIC PRODUCTS AT 260°C.

"KEL-F" THERMOPLASTIC

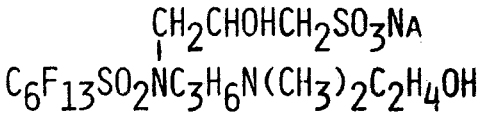
ACUTE ORAL TOXICITY (RAT):	>5 GM/KG	PRACTICALLY NON-TOXIC
PRIMARY SKIN IRRITATION (RABBIT):	0.0/8.0	NON-IRRITATING
EYE IRRITATION (RABBIT):	15.5/110.0	MINIMALLY IRRITATING

"LIGHT WATER" AQUEOUS FILM FORMING FOAMS

TYPICAL FORMULATION: FC-203

2-3%	FLUOROCHEMICAL FOAMER*
1-2%	FLUOROCHEMICAL SURFACTANTS†
3%	HYDROCARBON SURFACTANTS
2%	SOAP
65%	WATER
25%	BUTYL CARBITOL

*FLUOROCHEMICAL FOAMER



†FLUOROCHEMICAL SURFACTANT

FC-95 - $C_8F_{17}SO_3K$

USES: FIRE EXTINGUISHING LIQUIDS
ESPECIALLY GOOD FOR EXTINGUISHING SOLVENT AND FUEL FIRES

"LIGHT WATER" AFFF TOXICITY SUMMARY OF PRODUCTS

PRODUCT	PRIMARY SKIN IRRITATION	EYE IRRITATION	ACUTE ORAL TOXICITY
FC-201	0.0 NON-IRRITATING	12.7/110 MINIMALLY	LD_{50} 1.0-3.0 G/KG
FC-203A	0.0 NON-IRRITATING	11.0/110 MINIMALLY	LD_{50} >5 G/KG
FC-206	0.0 NON-IRRITATING	6.0*/110 MILDLY	LD_{50} >5 G/KG
FC-206A	0.1 MINIMALLY IRRITATING	17.1/110 MILDLY	LD_{50} > 5 G/KG
FC-206A DILUTED (6%)	0.0 NON-IRRITATING	0.0/110.0 NON-IRRITATING	
FC-600	.96 SLIGHTLY IRRITATING	9.3†/110.0 MODERATELY	LD_{50} >10 G/KG
FC-600 DILUTED (6%)	0.0 NON-IRRITATING	13.6/110.0 MINIMALLY	

*IRRITATING THROUGH 5 DAYS
†IRRITATING THROUGH 7 DAYS

"SCOTCHGARD/SCOTCHBAN" TEXTILE/PAPER TREATMENTS

"SCOTCHGARD" TEXTILE TREATMENTS

FLUOROCHEMICAL EMULSIONS

FC-234:

30% SOLIDS TERPOLYMER: METHYL FOSE ACRYLATE/
BUTYL ALCOHOL/
POLY MEG 2000 DIMETHYL ACRYLATE

IN: WATER
METHYL ISOBUTYL KETONE
ETHYLENE GLYCOL

FC-378:

30% SOLIDS 2 ET
FOSE†/TDI: URETHANE

IN: WATER
METHYL ISOBUTYL KETONE
ETHYLENE GLYCOL

*MEFOSE ACRYLATE: $C_8F_{17}SO_2N(CH_3)C_2H_4OC(=O)C(H)=CH_2$

†ETFOSE: $C_8F_{17}SO_2N(C_2H_3)C_2H_4OH$

USES: PROVIDES SOIL, STAIN AND WATER REPELLANCY TO A VARIETY OF FABRICS.

"SCOTCHBAN" PAPER TREATMENTS

FC-807: 33% SOLID SALT OF A FLUOROCHEMICAL PHOSPHATE ESTER

$$\left[C_8F_{17}SO_2N(C_2H_3)CH_2CH_2O\right]_2\overset{O}{\overset{\|}{P}}ONH_4$$

IN WATER AND ISOPROPYL ALCOHOL

USES: OIL AND STAIN RESISTANCE IN PAPER PRODUCTS. FC-807 IS CURRENTLY APPROVED BY THE U.S. FOOD AND DRUG ADMINISTRATION FOR USE IN FOOD PACKAGING.

"SCOTCHGARD/SCOTCHBAN" TOXICITY SUMMARY

SCOTCHGARD	PSI	GPS HSP*	EI	LD_{50} AOT	I.T.	AMES	SUB-CHRONIC DATA
FC-214	0.0	NEG.	0.0	>5G/KG	LOW HAZARD	N.K.	NO
FC-234	0.0	N.K.	47.31 MODERATELY	>5G/KG	N.K.	N.K.	NO
FC-380	0.0	NEG.	8.0 MINIMALLY	>10G/KG	LOW HAZARD	NEG.	NO
FC-388	0.0	NEG.	15.3 MILDLY	>5G/KG	LOW HAZARD	NEG.	NO
SCOTCHBAN							
FC-807	0.0	NEG.	<15.0 MINIMALLY	>15.4G/KG	N.K.	NEG.	YES
FC-808	<1.6 MINI-MALLY	N.K.	4.0 MINIMALLY	>15G/KG	N.K.	NEG.	YES

*GUINEA PIG SENSITIZATION HUMAN SKIN PATCH STUDY

"FLUORAD" SURFACTANTS

PERFLUOROOCTYL SULFONIC ACID DERIVATIVES

FC-95: $C_8F_{17}SO_3^-K^+$

FC-99: $C_8F_{17}SO_3^-H_2N^+(CH_2CH_2OH)_2$

FC-128: $C_8F_{17}SO_2NH(CH_2)_3N(CH_3)_3^+I'$

CARBOXYLIC ACID DERIVATIVE

FC-143: $C_7F_{13}COO'NH_4^+$

USES: REDUCE SURFACE TENSION OF AQUEOUS AND NON-AQUEOUS SYSTEMS: ETCHING BATHS, SPECIALTY INKS, FLOOR POLISH EMULSIONS AND PHOTOGRAPHIC SOLUTIONS, TEFLON EMULSIFIER.

FLUORAD SURFACTANT TOXICITY SUMMARY

	P.S.I.	E.I.	A.O.T.	I.T.	AMES	SUBCHRONIC
FC-95	0.0 NON-IRRITATING	9.3 MILDLY	LD_{50} 251MG/KG	LC_{50} 5.2MG/L	NEGATIVE	YES
FC-99	0.1 MINIMALLY	15.2 MILDLY	LD_{50} > 5G/KG	N.K.	N.K.	YES - 14 DAY SUBACUTE
FC-128	0.9 SLIGHTLY	5.8 MINIMALLY	LD_{50} 1250MG/KG SLIGHTLY	LC_{50} 22.22-6623 MG/L	N.K.	NO
FC-134	0.5 MINIMALLY	7.0 MINIMALLY	LD_{50} 500MG/KG MODERATELY TOXIC	LD_{50} >5.1MG/L RESPIRATORY IRRITANT	N.K.	NO
FC-143	0.0 NON-IRRITATING	14.0 MINIMALLY	LD_{50} 540MG/KG	LC_{50} >18.6MG/L RESPIRATORY IRRITANT	NEGATIVE	YES

MANUFACTURE OF FC-143
CARBOXYLIC ACID DERIVATIVE

100% PERFLUOROOCTANOIC ACID

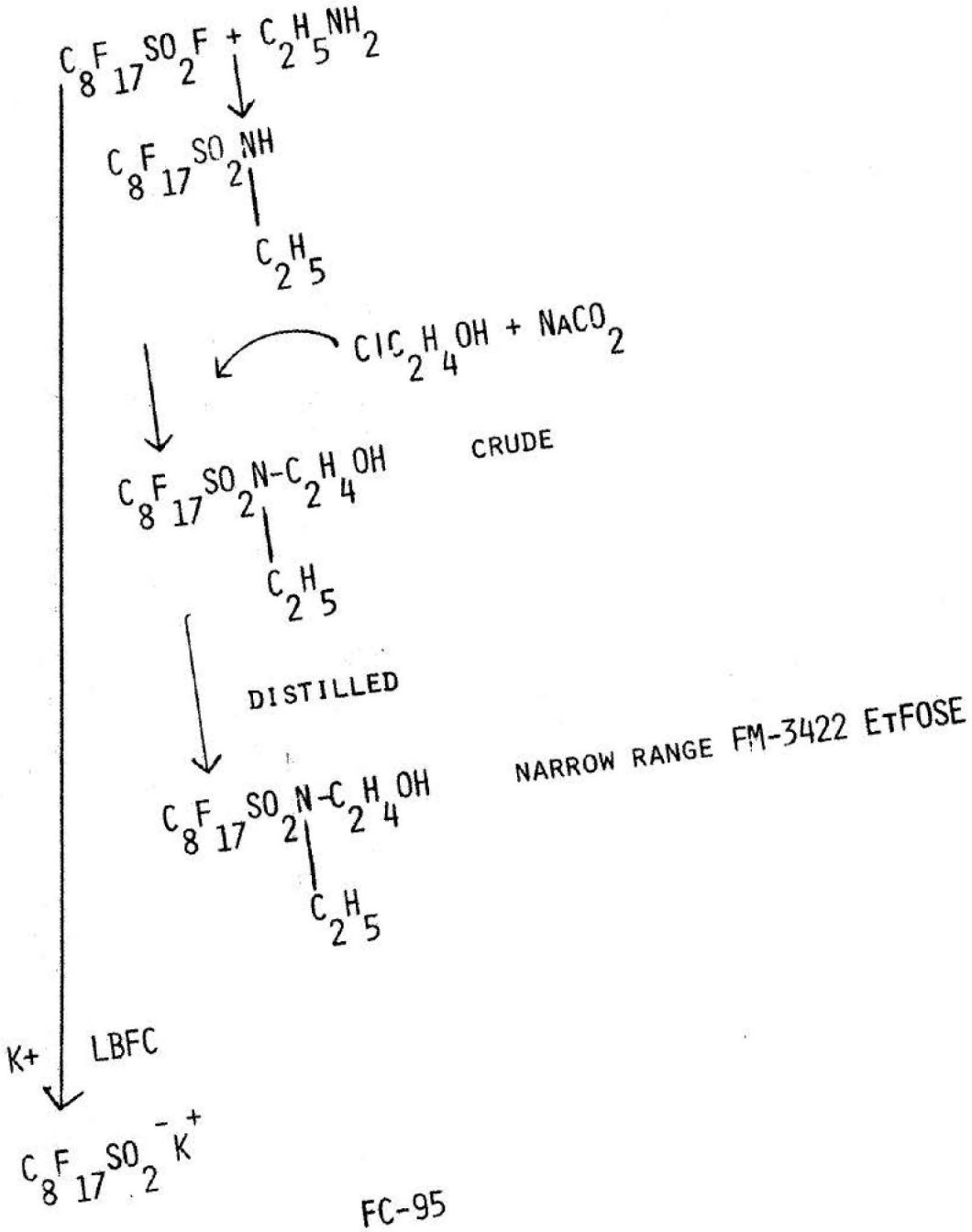
$C_7F_{15}CO_2H + NH_3$

↓

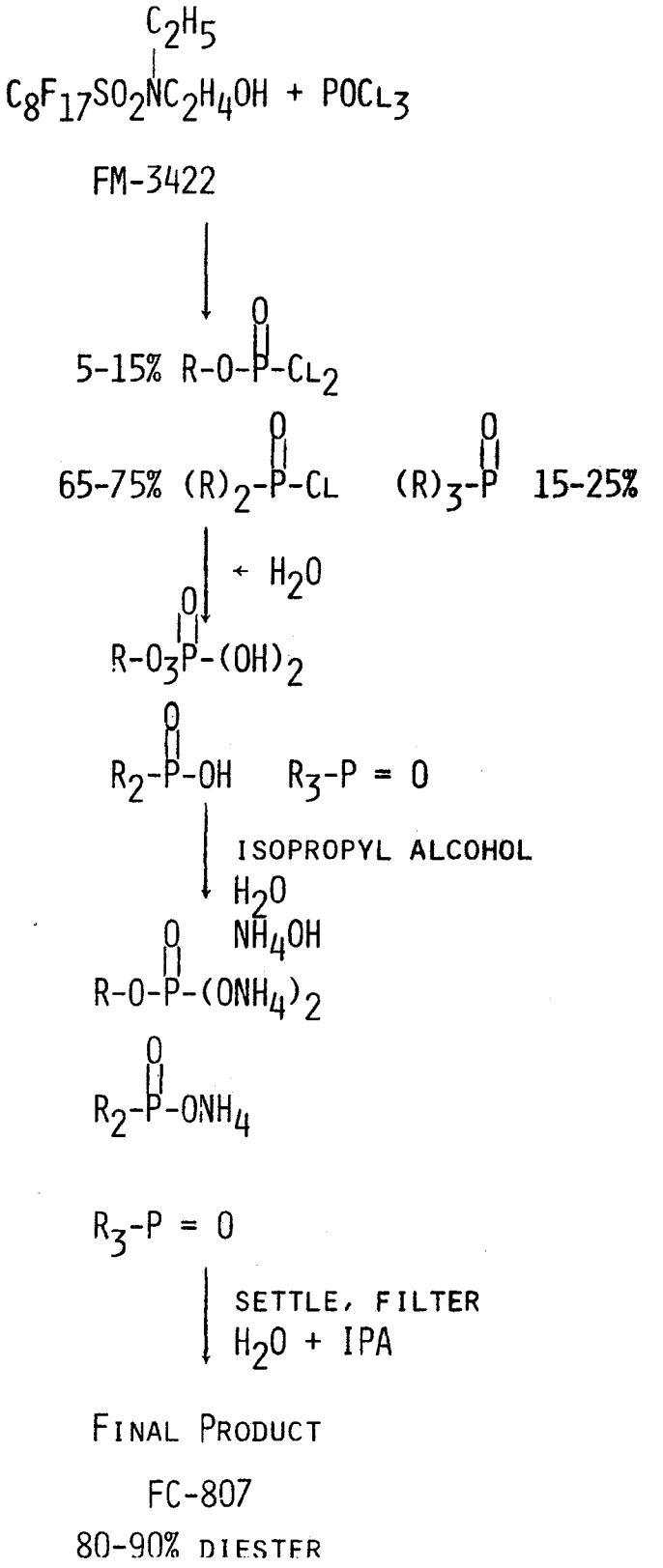
$C_7F_{15}CO_2NH_4$

FC-143

MANUFACTURE OF ETFOSE ALCOHOL AND FC-95



MANUFACTURE OF FC-807



PRODUCT LINES BASED ON

PERFLUOROOCTYL SULFONYL ACID DERIVATIVES

"FLUORAD" Surfactants	27
"SCOTCHGARD" Fabric and Textile Treatments	58
"SCOTCHBAN" Paper Treatments	10
"LIGHTWATER" Aqueous Film Forming Foams (C_6 Sulfonyl Acid Derivatives)	10

CHRONOLOGY OF EVENTS LEADING TO THE INITIATION OF 90 DAY STUDIES

1971 D. R. TAVES REPORTS ORGANIC AND INORGANIC FORMS OF FLUORINE IN HUMAN SERUM.

1975 TAVES PRESENTS ^{19}F NMR SPECTRA DATA TO 3M

CRL IDENTIFIES ^{19}F NMR SPECTRUM AS $C_8F_{17}SO_3H$ OR ITS SALTS

1976 ANALYTICAL METHOD FOR LOW LEVEL DETECTION OF R^+F' DEVELOPED

3M WORKERS SAMPLED

CARBOXYLIC ACID IDENTIFIED IN 3M EMPLOYEE $C_7F_{15}COO'H^+$

1977 ANALYSIS OF R^+F' LEVELS IN SHORT-TERM ANIMAL STUDIES BEGINS

90 DAY STUDIES ON FC-143, FC-95 AND FM-3422 INITIATED

90 DAY ORAL STUDY, FC-143, RAT

Dose	Deaths	Pharmacotoxic signs and Pathology
10ppm	0/10	No remarkable pathology
30ppm	0/10	In males: Increased liver and kidney weights
100ppm	1/10*	In males: Increased kidney weights
300ppm	1/10*	In males: Increased liver and kidney weights, some liver pathology
1000ppm	0/10	In males: Liver discoloration with slight hypertrophy of the hepatocytes. Blood effects.

*Rats died after blood collection.

90 DAY ORAL STUDY, FC-143, RHESUS MONKEY

DOSE	DEATHS	PHARMACOTOXIC SIGNS, PATHOLOGY
3 MG/KG/DAY	0/4	SOFT STOOL, OCCASIONAL EMESIS. INCREASED PLATELET COUNT
10 MG/KG/DAY	0/4	ANOREXIA, PALE FACE & GUMS INCREASE IN ACTIVATED PARTIAL PROTHROMBIN TIME (APPT)
30 MG/KG/DAY	3/4	SAME AS ABOVE, SWOLLEN FACE AND EYES DECREASED ACTIVITY PROSTRATION DEATH 7-12 WEEKS HIGHLY INCREASED APPT. PATHOLOGY REVEALED HEMOPOETIC EFFECT
100 MG/KG/DAY	4/4	SAME AS ABOVE. DEATH 2-5 WEEKS.

90 DAY ORAL STUDIES FC-95, RAT

DOSE	DEATH	PHARMACOTOXIC SIGNS & PATHOLOGY
30PPM	0/10	NO SIGNIFICANT PHARMACOTOXIC SIGNS. PATHOLOGY REVEALED SOME MINOR LIVER EFFECTS.
100PPM	5/10	INCREASED SENSITIVITY TO EXTERNAL STIMULI. CONSULSIONS, CNS EFFECTS. LIVER NECROSIS, GI TRACT HEMORRHAGING. HEMATOPOETIC EFFECT: THYMUS, SPLEEN AND MESENTARY LYMPH NODES.
300PPM	10/10	INCREASED SENSITIVITY TO EXTERNAL STIMULI. EMACIATION, CONVULSIONS. HUNCHED BACK. PATHOLOGY SAME AS 100PPM
1000PPM	10/10	SAME AS ABOVE.
3000PPM	10/10	SAME AS ABOVE, REDUCED MOTOR ACTIVITY.

90 DAY ORAL RHESUS MONKEY STUDY FC-95 I.

DOSE	DEATH	PHARMACOTOXIC SIGNS & PATHOLOGY
10MG/KG/DAY	4/4 (11-20 DAY)	ANOREXIA, SLIGHT TO SEVERE DECREASES IN ACTIVITY, EMESIS, BODY TREMORS, TWITCHING, CONVULSIONS AND PROSTRATION. LIVER DISCOLORATION NOTED BUT NO HISTOPATHOLOGICAL EVIDENCE OF DAMAGE.
30MG/KG/DAY	4/4 (7-10 DAY)	SAME AS ABOVE.
100MG/KG/DAY	4/4 (3-5 DAY)	SAME AS ABOVE.
300MG/KG/DAY	4/4 (2-4 DAY)	SAME AS ABOVE.

II. 90 DAY ORAL RHESUS MONKEY TOXICITY STUDY

DOSE	DEATH	PHARMACOTOXIC SIGNS & PATHOLOGY
0.5MG/KG.DAY	0/4	GI TRACT TOXICITY. LIPID DEPLETION OF ADRENALS, ATROPHY OF PANCREATIC EXOCRINE CELLS AND SEROUS ALVEOLAR CELLS OF THE SALIVARY GLANDS.
1.5MG/KG/DAY	0/4	GI TRACT TOXICITY. SAME AS ABOVE.
4.5MG/KG/DAY	4/4 (5-7 WEEK)	GI TRACT TOXICITY. SEVERE RIGIDITY, CONVULSIONS, BODY TREMORS, PROSTRATION, AND WEIGHT LOSS.

90 DAY RAT FM 3422

Dose	Death	Pharmacotoxic Signs & Pathology
30ppm	0/10	
100ppm	0/10	In males: increased liver and kidney weight.
300ppm	2/10*	Increased liver and kidney weights. Liver and kidney discoloration. Liver: hypertrophy and necrosis. Kidney: Tubular nephrosis.
1000ppm	10/10	Increased sensitivity to external stimuli. Emaciation, hunched back, convulsions. Same as above.
3000ppm	10/10	Same as above.
10,000ppm	10/10	Same as above.

*Died after blood collection.

90 DAY ORAL RHESUS MONKEY STUDY FM 3422

DOSE	DEATH	PHARMACOTOXIC SIGNS & PATHOLOGY
1MG/KG/DAY	0/4	DIARRHEA, NO REMARKABLE GROSS OR HISTOPATHOLOGY.
3MG/KG/DAY	0/4	DIARRHEA, NO REMARKABLE GROSS OR HISTOPATHOLOGY.
10MG/KG/DAY	0/4	DIARRHEA, IN MALES INCREASE LIVER WEIGHT. NO HISTOPATHOLOGY.
30MG/KG/DAY	1/4	BLOODY MUCOUS IN STOOL, EMESIS, DIARRHEA. IN MALES INCREASED LIVER WEIGHT. LIPID DEPLETION OF ADRENALS. MODERATE ATROPHY OF PANCREATIC EXOCRINE CELLS.

COMPARISON OF THE SUBACUTE DATA

1. FC-95 IS THE MOST TOXIC OF THE THREE COMPOUNDS. FOLLOWED BY FM-3422 AND FC-143

2. IN GENERAL MALE RATS WERE MORE SENSITIVE TO THE COMPOUNDS THAN FEMALE RATS.

3. NO APPARENT SEX DIFFERENCES WERE NOTED WITH MONKEYS.

4. THE TARGET ORGANS IN RATS WERE THE LIVER, KIDNEY, CENTRAL NERVOUS SYSTEM (CNS), GI TRACT, AND RETICULOENDOTHELIAL SYSTEM. IN MONKEYS THE LIVER AND KIDNEY EFFECTS WERE ABSENT. GI TRACT DISTURBANCES, RETICULOENDOTHELIAL SYSTEM AND CNS TOXICITY WERE EVIDENT.

5. MONKEYS WERE GENERALLY MORE SENSITIVE TO THE FLUOROCHEMICAL TOXICITY THAN RATS. 10 PPM IN DIET ~/MG/KG/DAY

	RAT	MONKEY
FC-143	0/10 @ 100 MG/KG/DAY	3/4 30 MG/KG/DAY
FC-95	5/10 @ 10 MG/KG/DAY	4/4 4.5 MG/KG/DAY
FM-3422	10/10 @ 100 MG/KG/DAY	1/4 30 MG/KG/DAY

METABOLISM STUDIES

POSITION OF CARBON-14 LABEL

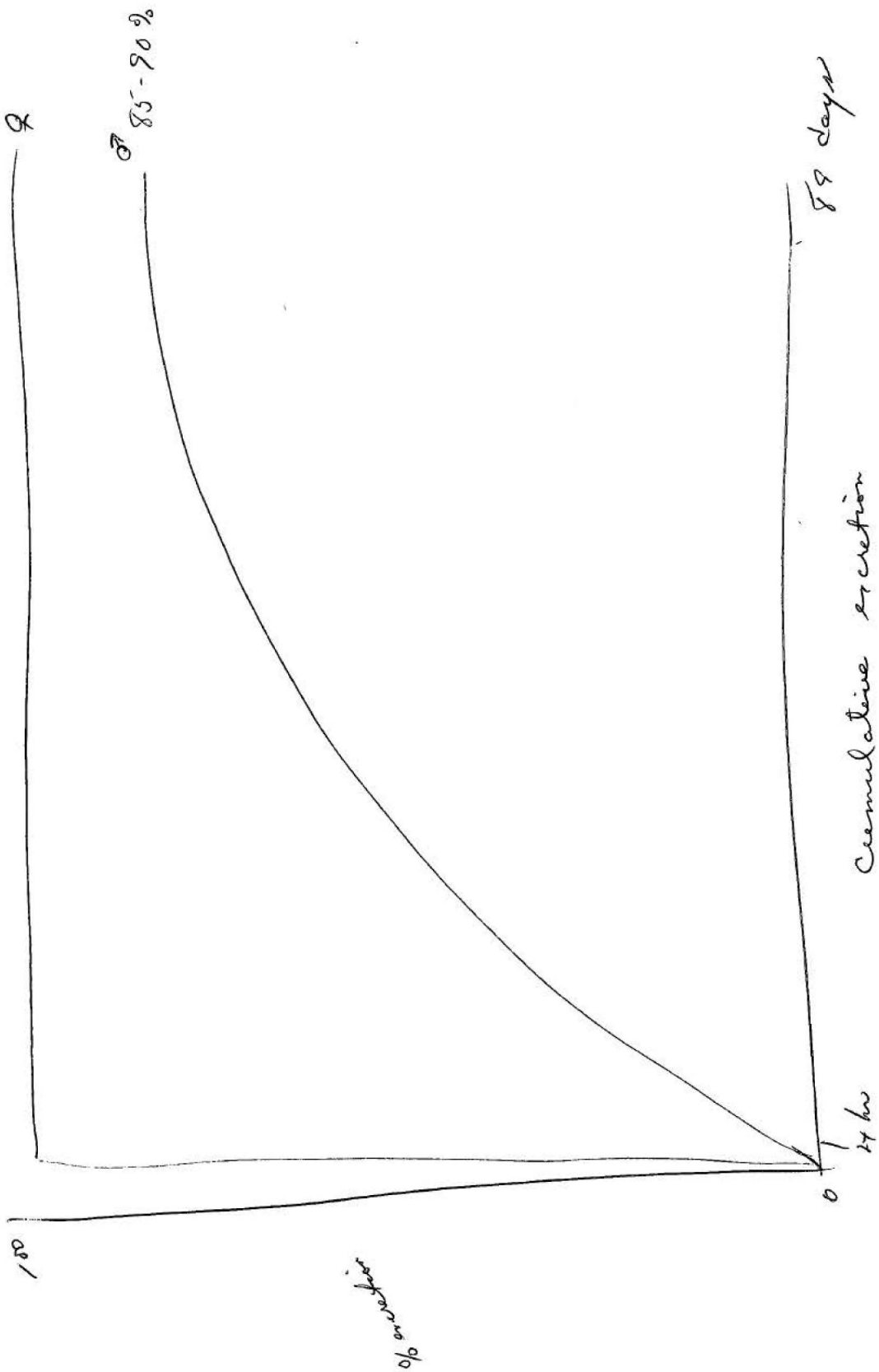
FC-143 $C_7F_{15}{}^*COO^-NH_4^+$

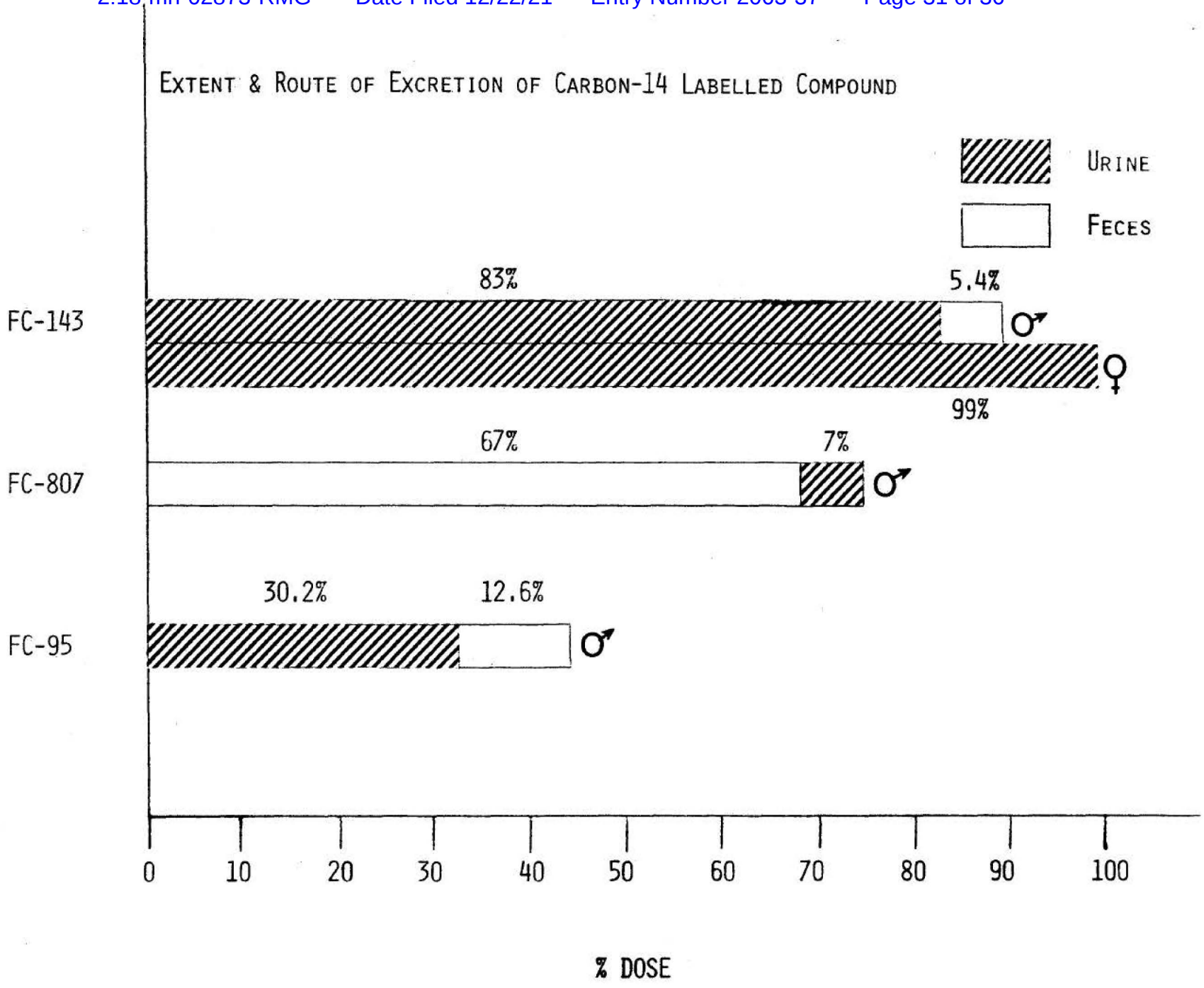
FC-95 $C_7F_{15}{}^*CF_2SO_3^-K^+$

FC-807 $(C_7F_{15}{}^*CF_2SO_2N(C_2H_5)CH_2CH_2O)_2PO_2^-NH_4^+$

ORAL ABSORPTION OF ^{14}C LABELLED FLUOROCHEMICALS

FC-807	≤ 5%
FC-95	~95%
FC-143	~93%


Q
♂ 85-90 %
99 days
Cumulative excretion
24 hr
0
100
% excretion

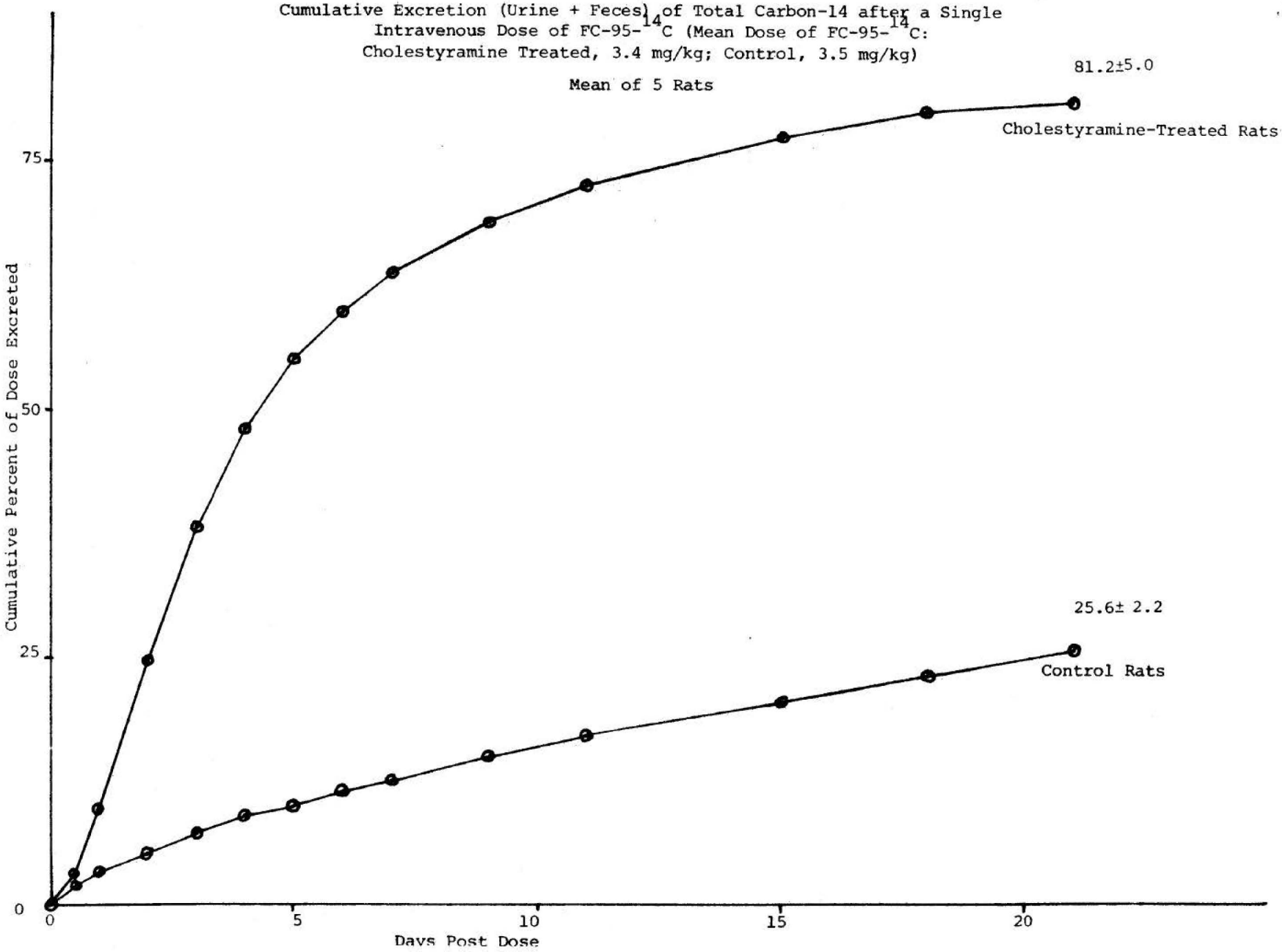


TISSUE DISTRIBUTION OF ^{14}C LABELLED FLUOROCHEMICALS

	FC-143 % OF DOSE	FC-95 µG/G TISSUE	FC-807 µG/G TISSUE
1. LIVER	2.5%	20.6	31
2. SPLEEN	<0.5%	0.5	277
3. PLASMA	1.1%	2.2	1.5
4. BONE MARROW	<0.5%	0.5	73
5. KIDNEY	<0.5%	1.1	1.7
6. ADRENALS	<0.5%	<0.5	3.9
7. RBC	<0.5%	N.R.	1.2
8. EYE	<0.5%	0.5	0.2
9. LUNG	<0.5%	1.1	N.R.

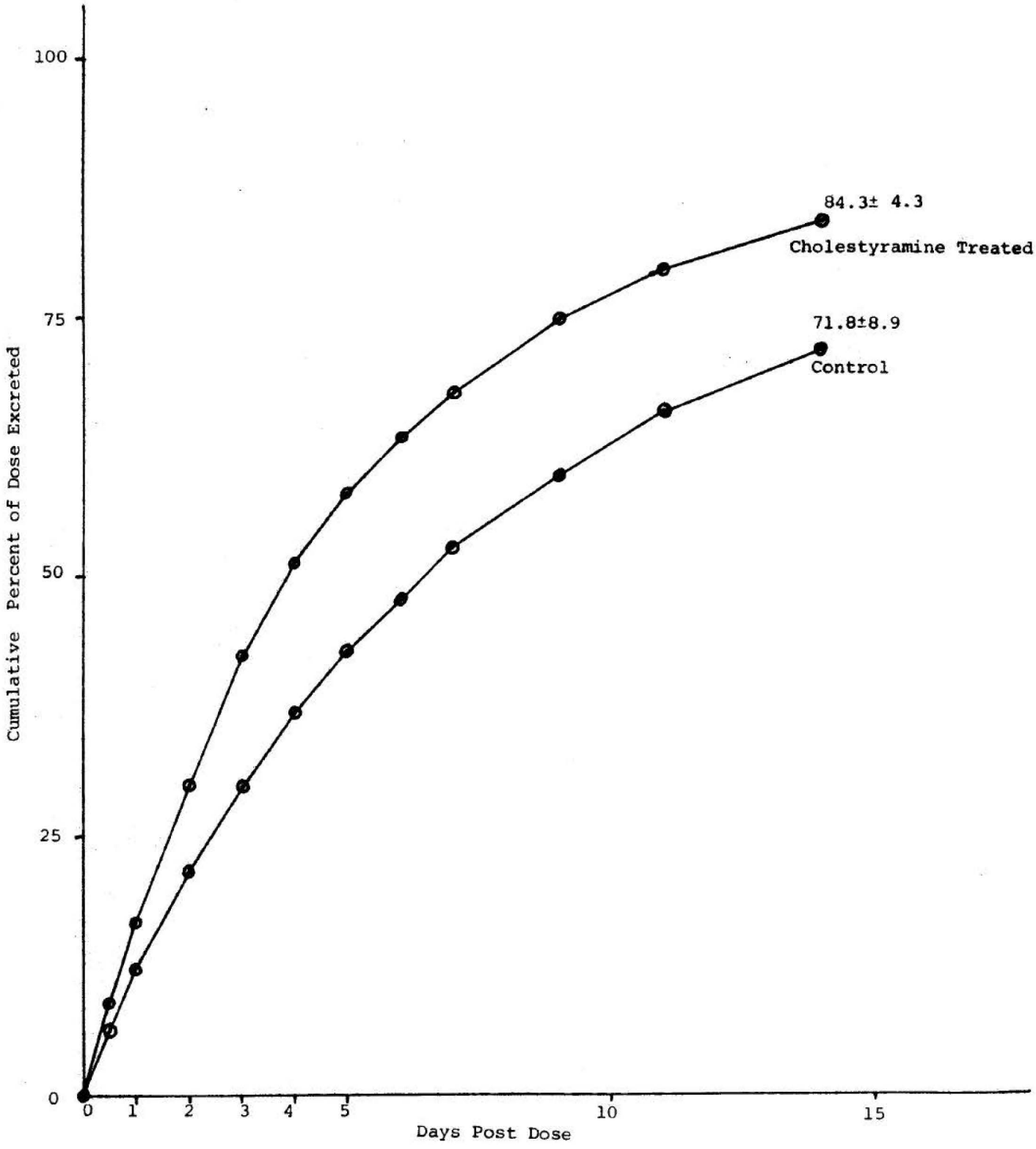
Cumulative Excretion (Urine + Feces) of Total Carbon-14 after a Single Intravenous Dose of FC-95-^{14}C (Mean Dose of FC-95-^{14}C: Cholestyramine Treated, 3.4 mg/kg; Control, 3.5 mg/kg)

Mean of 5 Rats



Cumulative Excretion (Urine + Feces) of Total Carbon-14 After a Single Intravenous Dose of FC-143-^{14}C (Mean Dose of FC-143-^{14}C: Cholestyramine Treated, 13.3 mg/kg; Control, 13.5 mg/kg)

Mean of 5 Rats



WHAT HAVE THE ANIMAL STUDIES ON FC-95 AND FC-143 SHOWN?

1. FC-95 APPEARS TO BE THE MOST TOXIC OF THE COMPOUNDS EXAMINED.
2. FC-143 APPEARS TO BE THE LEAST TOXIC.
3. BOTH ARE WELL ABSORBED FROM THE GI TRACT.
4. FC-143 APPEARS TO BE QUICKLY ELIMINATED.
5. FC-95 IS SLOWLY ELIMINATED.
6. BOTH COMPOUNDS APPEAR TO HAVE EFFECTS ON THE HEMOPOETIC SYSTEM AND GI TRACT. THE LIVER AND KIDNEY EFFECTS PRESENT IN RODENTS ARE ABSENT IN PRIMATES.
7. MALE RATS ARE MORE SENSITIVE THAN FEMALE RATS.
8. PRIMATES ARE MORE SENSITIVE THAN RATS.
9. CHOLESTYRAMINE ADMINISTRATION MAY BE A POSSIBLE WAY TO ELIMINATE FC IN THE BLOOD OF WORKERS.

Other Animal Toxicity Studies in Progress

1. Surfactant skin absorption study:contrasting solid and liquid forms of the surfactants

2. Teratology study on FC-95 and FM-3422

3. Further investigation platelet aggregation and APTT.